



# UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE  
United States Patent and Trademark Office  
Address: COMMISSIONER FOR PATENTS  
P.O. Box 1450  
Alexandria, Virginia 22313-1450  
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/581,237	05/29/2007	Ralf Hochhausen	2003P01871WOUS	1337

46726 7590 10/03/2007  
BSH HOME APPLIANCES CORPORATION  
INTELLECTUAL PROPERTY DEPARTMENT  
100 BOSCH BOULEVARD  
NEW BERN, NC 28562

EXAMINER

AURORA, REENA

ART UNIT	PAPER NUMBER
----------	--------------

2862

MAIL DATE	DELIVERY MODE
-----------	---------------

10/03/2007

PAPER

**Please find below and/or attached an Office communication concerning this application or proceeding.**

The time period for reply, if any, is set in the attached communication.

**Office Action Summary**

Application No.

10/581,237

Applicant(s)

HOCHHAUSEN ET AL.

Examiner

Reena Aurora

Art Unit

2862

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 2 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☐ Responsive to communication(s) filed on \_\_\_\_.
- 2a) ☐ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☒ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 15 - 24 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_ is/are allowed.
- 6) ☐ Claim(s) \_\_\_\_ is/are rejected.
- 7) ☒ Claim(s) 15 - 24 is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☒ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 06/2/06 is/are: a) ☐ accepted or b) ☒ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some \* c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
  2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_.
  3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- |  |  |
|--|--|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892)   | 4) <input type="checkbox"/> Interview Summary (PTO-413)<br>Paper No(s)/Mail Date. ____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)   | 5) <input type="checkbox"/> Notice of Informal Patent Application                      |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08)<br>Paper No(s)/Mail Date <u>6/2/06, 6/22/06</u> | 6) <input type="checkbox"/> Other: ____  |

### **DETAILED ACTION**

This application is in condition for allowance except for the following formal matters:

#### ***Drawings***

The drawings are objected to because boxes in fig. 1 and fig. 4 are not labeled. Corrected drawing sheets in compliance with 37 CFR 1.121(d) are required in reply to the Office action to avoid abandonment of the application. Any amended replacement drawing sheet should include all of the figures appearing on the immediate prior version of the sheet, even if only one figure is being amended. The figure or figure number of an amended drawing should not be labeled as "amended." If a drawing figure is to be canceled, the appropriate figure must be removed from the replacement sheet, and where necessary, the remaining figures must be renumbered and appropriate changes made to the brief description of the several views of the drawings for consistency. Additional replacement sheets may be necessary to show the renumbering of the remaining figures. Each drawing sheet submitted after the filing date of an application must be labeled in the top margin as either "Replacement Sheet" or "New Sheet" pursuant to 37 CFR 1.121(d). If the changes are not accepted by the examiner, the applicant will be notified and informed of any required corrective action in the next Office action. The objection to the drawings will not be held in abeyance.

***Specification***

The disclosure is objected to because of the following informalities: Applicant is suggested to claim numbers from the specification, note para [006].

Appropriate correction is required.

***Claim Objections***

Claim 15 is objected to because of the following informalities:

Line 3, the phrase "the times" lacks antecedent basis.

Line 4, the phrase "the period" lacks antecedent basis.

Line 4, the phrase "the reference position" lacks antecedent basis.

Line 5, the phrase "the oscillator" lacks antecedent basis.

Line 7, the phrase "the time duration" lacks antecedent basis.

Lines 10 - 11, the phrase "the deviation" lacks antecedent basis.

Appropriate correction is required.

Claim 22 is objected to because of the following informalities:

Line 1, the phrase "the rotor position" lacks antecedent basis.

Line 2, the phrase "the passage" lacks antecedent basis.

Line 4, the phrase "the output signal" lacks antecedent basis.

Line 8, the phrase "the correction signal" lacks antecedent basis.

Lines 9 - 10, the phrase "the reference position" lacks antecedent basis.

Line 13, the phrase "the average" lacks antecedent basis.

Appropriate correction is required.

***Allowable Subject Matter***

The following is a statement of reasons for the indication of allowable subject matter:

As to claims 15 – 21, the prior art fails to show deriving the rotor position wherein the time duration between two reference position passages is measured and a time derived from this time duration is predetermined as the period of the oscillator, and that the derivation of the time predefined as the period of the oscillator comprises a step of averaging over time durations determined from respectively n successive reference position passages. These features taken together with the other limitations of the claim renders the claims allowable over prior art.

As to claims 22 – 24, the prior art fails to show comprising a device for determining the rotor position comprising wherein the phase locking loop comprises a tunable oscillator, a phase comparator for delivering a correction signal representative for a phase difference between an output signal of the detector and an output signal of the tunable oscillator, a low-pass filter for the correction signal, a time-measuring circuit for determining a period duration between two passages of the rotor through the reference position and a superposition circuit for superposing an output signal of the time-measuring circuit representative of the determined period duration and the low-pass-filtered correction signal to produce a tuning signal for the oscillator, and that the time-measuring circuit comprises an average value circuit for forming the average of the time intervals between n successive passage of the rotor through the reference

Art Unit: 2862

position. These features taken together with the other limitations of the claim renders the claims allowable over prior art.

Prosecution on the merits is closed in accordance with the practice under *Ex parte Quayle*, 25 USPQ 74, 453 O.G. 213, (Comm'r Pat. 1935).

A shortened statutory period for reply to this action is set to expire **TWO MONTHS** from the mailing date of this letter.


Any inquiry concerning this communication or earlier communications from the examiner should be directed to Reena Aurora whose telephone number is 571-272-2263. The examiner can normally be reached on Monday - Friday, 7:00 - 3:30.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, P. Assouad can be reached on 571-272-2210. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Art Unit: 2862

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

Reena Aurora

  
REENA AURORA  
PRIMARY EXAMINER  
TECHNOLOGY CENTER 2800